

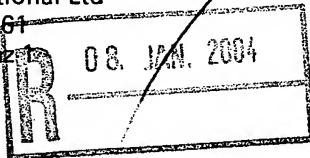
Rec'd PCT/PTO 12 OCT 2004

PCT/IB2003/001350

## TENT COOPERATION TREATY

PCT

NOTIFICATION OF THE RECORDING  
OF A CHANGE(PCT Rule 92bis.1 and  
Administrative Instructions, Section 422)

Date of mailing (day/month/year) 06 January 2004 (06.01.2004)	To:  DÜNNWALD, Dieter Clariant International Ltd Rothausstrasse 61 CH-4132 Muttenz Switzerland 
Applicant's or agent's file reference 2002CH001	<b>IMPORTANT NOTIFICATION</b>
International application No. PCT/IB2003/001350	International filing date (day/month/year) 10 April 2003 (10.04.2003)

## 1. The following indications appeared on record concerning:

the applicant     the inventor     the agent     the common representative

Name and Address CLARIANT INTERNATIONAL LTD Rothausstrasse 61 CH-4132 Muttenz 1 Switzerland	State of Nationality CH	State of Residence CH
	Telephone No. 00 41 61 469 5241	
	Facsimile No. 00 41 61 469 6588	
	Teleprinter No.	

## 2. The International Bureau hereby notifies the applicant that the following change has been recorded concerning:

the person     the name     the address     the nationality     the residence

Name and Address CLARIANT FINANCE (BVI) LIMITED Citco Building, Wickhams Cay P.O. Box 662 Road Town, Tortola British Virgin Islands	State of Nationality **	State of Residence **
	Telephone No.	
	Facsimile No.	
	Teleprinter No.	

## 3. Further observations, if necessary:

Following an assignment, the applicant indicated in Box 1 becomes applicant for Japan and Europe only. The applicant indicated in Box 2 becomes applicant for all designated States except US, Japan and Europe.

## 4. A copy of this notification has been sent to:

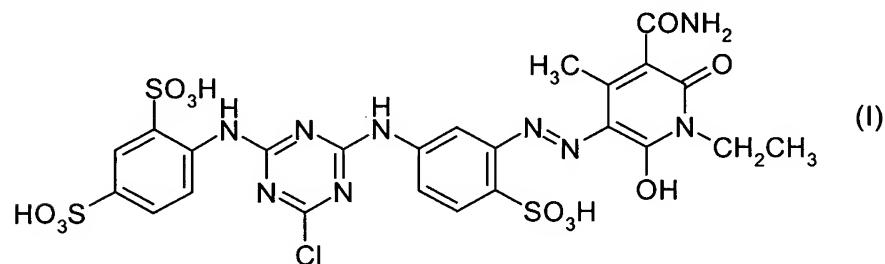
<input checked="" type="checkbox"/> the receiving Office	<input type="checkbox"/> the designated Offices concerned
<input type="checkbox"/> the International Searching Authority	<input checked="" type="checkbox"/> the elected Offices concerned
<input checked="" type="checkbox"/> the International Preliminary Examining Authority	<input type="checkbox"/> other:

The International Bureau of WIPO 34, chemin des Colombettes 1211 Geneva 20, Switzerland  Facsimile No. (41-22) 338-7060	Authorized officer  Fabienne SOCIÉ  Telephone No. (41-22) 338 9175
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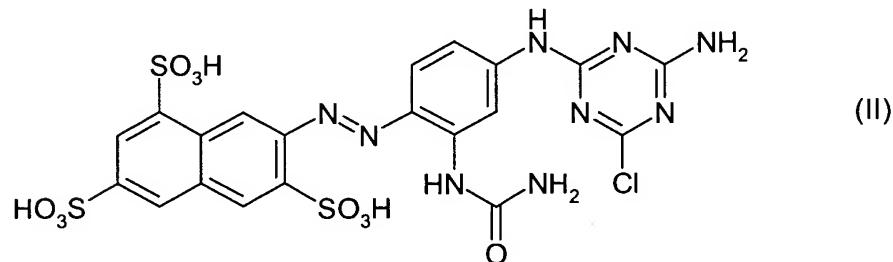
*REPLACED BY  
ART 34 AMDT*

**CLAIMS**

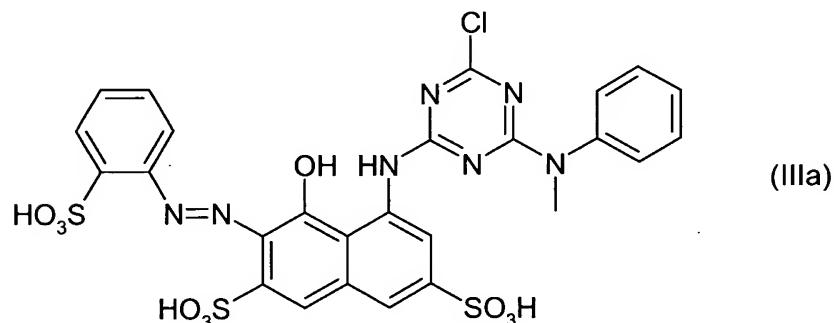
1. A printing process showing no catalytic fading comprising in a first step applying  
 5 at least one dyestuff or a dyestuff mixture selected from the dyes of the formula  
 (I) or (II) or (IIIa) or (IIIb) or (IV) or (V) or (VI) or (VII) or (VIII) or (IX) or (X)  
 or (XI)



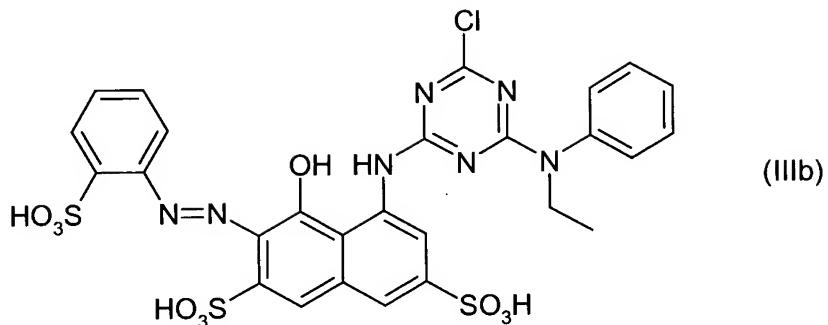
10 or



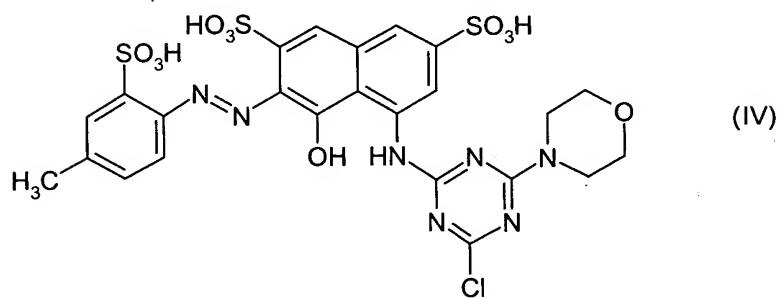
or



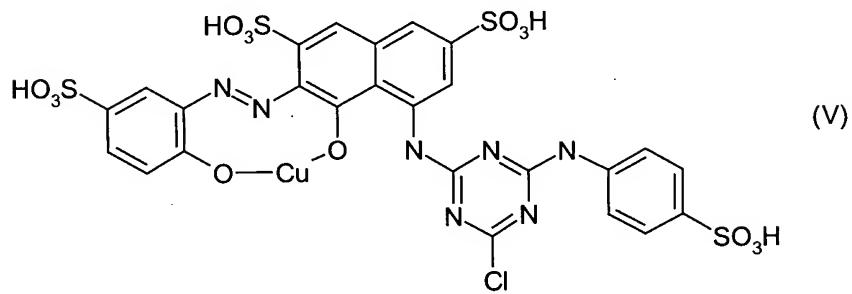
or



or

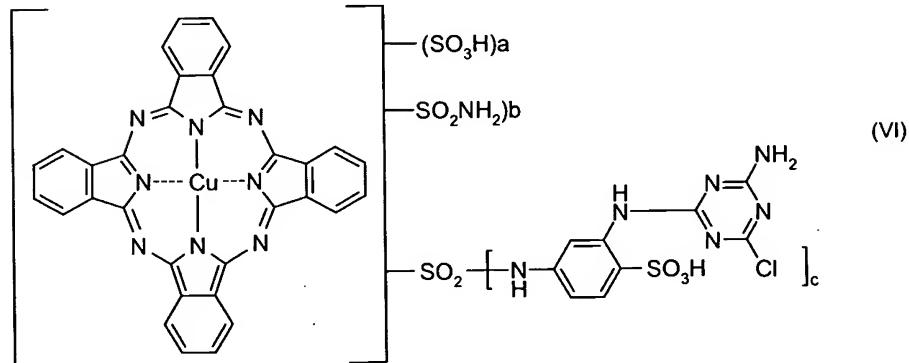


or



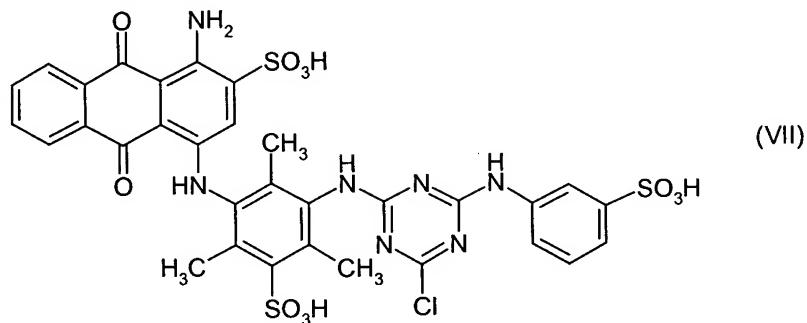
5

or



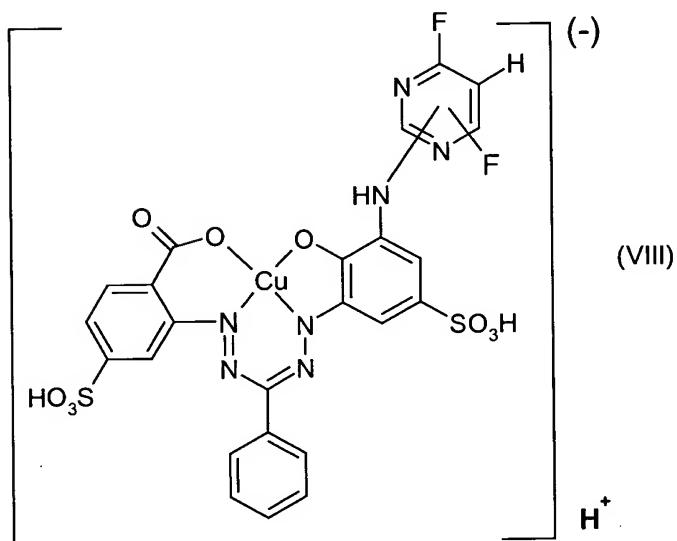
with **a** having values from 4 to 0 and **b** having values from 0 to 4 with the proviso that the sum of **a + b** does not exceed 4 and **c** has the values from 1 to 2.

or

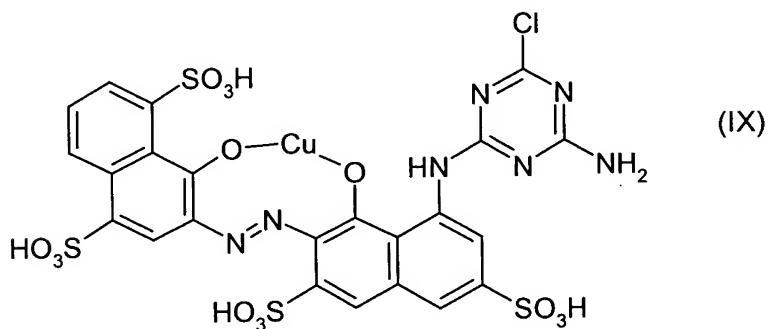


5

or



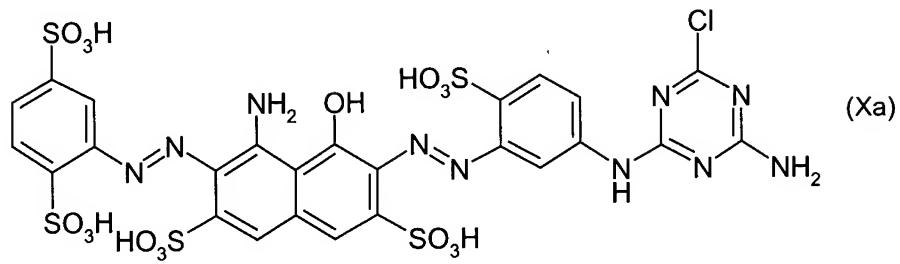
or



or

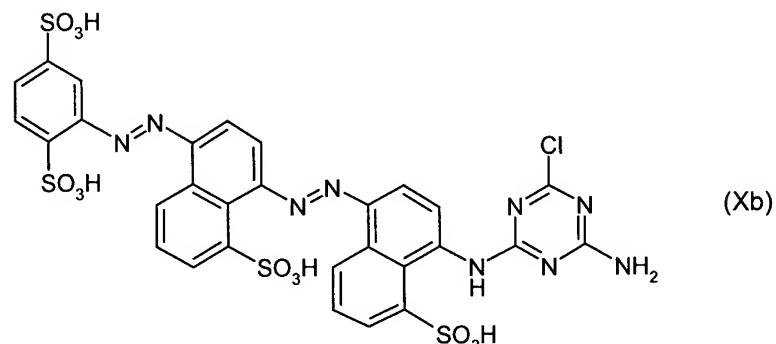
dye composition (X) which is a mixture comprising the following three dyestuffs (Xa), (Xb) and (Xc)

61 parts of the dye (Xa)



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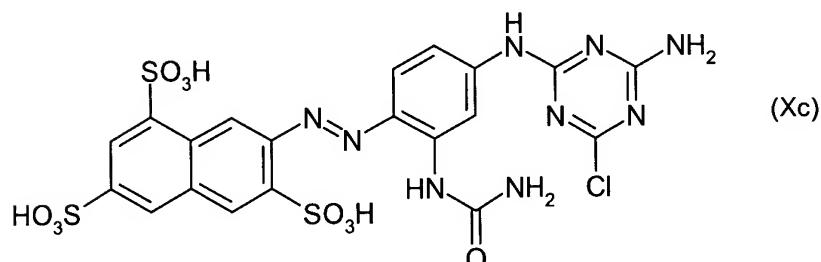
28 parts of the dyes (Xb)



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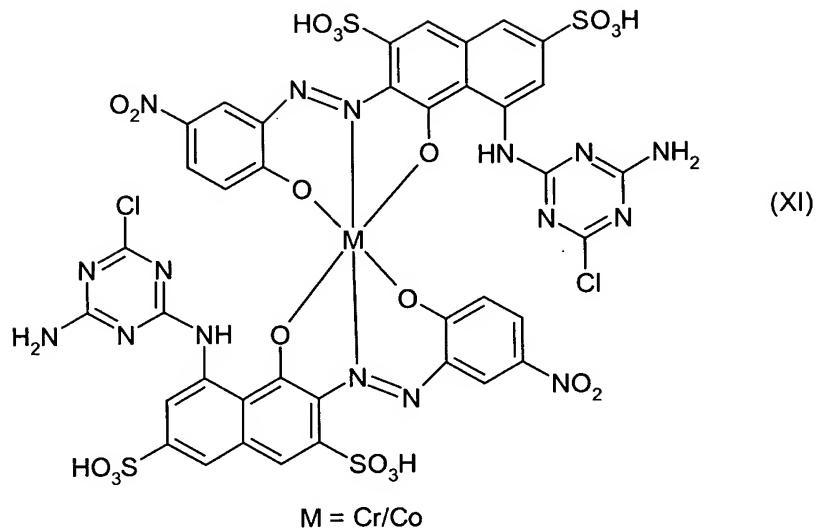
and

9 parts of the dye (Xc)



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or



and in a second step applying at least one dyestuff or a dyestuff mixture selected from at dye of the formula (I) or (II) or (IIIa) or (IIIb) or (IV) or (V) or (VI) or (VII) or (VIII) or (IX) or (X) or (XI) with the proviso that the dyestuff or mixture of dyestuffs in the second step is not the same dyestuff or mixture of dyestuff as selected in the first step.

2. A printing process showing no catalytic fading according to claim 1 charactericed in that in a third step a comprises applying at least one dyestuff or a dyestuff mixture selected from at dye of the formula (I) or (II) or (IIIa) or (IIIb) or (IV) or (V) or (VI) or (VII) or (VIII) or (IX) or (X) or (XI) with the proviso that the dyestuff or mixture of dyestuffs in the third step is not the same dyestuff or mixture of dyestuff as selected in the first step or in the second step.

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3. A printing process showing no catalytic fading according to claim 1 or 2, charactericed in that the printing process is a polychromatic printing process for printing recording materials.

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4. A printing process showing no catalytic fading according to claim 1 or 2 charactericed in that hydroxy group containing substrates are printed.

5. A printing process showing no catalytic fading according to claim 1 or 2  
charactericed in that the printing process is a ink jet printing process

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6. A printing process showing no catalytic fading according to claim 1 or 2  
charactericed in that the total content of salts is less than 0.5% by weight, based  
on the total weight of the dyes.

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7. Use of composition for printing recording materials by the inkjet printing process,  
comprising

1) at least one dye of the formula (I) or (V) or (VI) or (VIII),

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2) water or a medium including a mixture of water and an organic solvent,  
an anhydrous organic solvent or a solid having a low melting point,

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8. Use according to claim 7 charactericed in that the composition used according to  
claim 7 has a total content of salts less than 0.5% by weight, based on the total  
weight of the dyes.

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9. Use according to claim 7 characterized in that paper and papery substrates, textile  
fibre materials and plastic films and plastic transparencies comprising hydroxy  
groups are printed.

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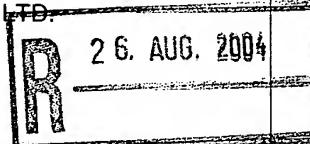
10. Use according to any of the claims 7 charactericed in that the printing process is a  
ink jet printing process.

# PATENT COOPERATION TREATY

From the  
INTERNATIONAL PRELIMINARY EXAMINING AUTHORITY

To:

DÜNNWALD, Dieter  
CLARIANT INTERNATIONAL LTD.  
Rothausstrasse 61  
CH-4132 Muttenz 1  
SUISSE



**PCT**

## NOTIFICATION OF TRANSMITTAL OF THE INTERNATIONAL PRELIMINARY EXAMINATION REPORT

(PCT Rule 71.1)

	Date of mailing (day/month/year)	
	25.08.2004	
<b>IMPORTANT NOTIFICATION</b>		
International application No.	International filing date (day/month/year)	Priority date (day/month/year)
PCT/B 03/01350	10.04.2003	12.04.2002
Applicant CLARIANT FINANCE (BVI) LIMITED		

1. The applicant is hereby notified that this International Preliminary Examining Authority transmits herewith the international preliminary examination report and its annexes, if any, established on the international application.
2. A copy of the report and its annexes, if any, is being transmitted to the International Bureau for communication to all the elected Offices.
3. Where required by any of the elected Offices, the International Bureau will prepare an English translation of the report (but not of any annexes) and will transmit such translation to those Offices.

#### 4. REMINDER

The applicant must enter the national phase before each elected Office by performing certain acts (filing translations and paying national fees) within 30 months from the priority date (or later in some Offices) (Article 39(1)) (see also the reminder sent by the International Bureau with Form PCT/B/301).

Where a translation of the international application must be furnished to an elected Office, that translation must contain a translation of any annexes to the international preliminary examination report. It is the applicant's responsibility to prepare and furnish such translation directly to each elected Office concerned.

For further details on the applicable time limits and requirements of the elected Offices, see Volume II of the PCT Applicant's Guide.

The applicant's attention is drawn to Article 33(5), which provides that the criteria of novelty, inventive step and industrial applicability described in Article 33(2) to (4) merely serve the purposes of international preliminary examination and that "any Contracting State may apply additional or different criteria for the purposes of deciding whether, in that State, the claimed inventions is patentable or not" (see also Article 27(5)). Such additional criteria may relate, for example, to exemptions from patentability, requirements for enabling disclosure, clarity and support for the claims.

Name and mailing address of the international preliminary examining authority:	Authorized Officer
 European Patent Office - P.B. 5818 Patentlaan 2 NL-2280 HV Rijswijk - Pays Bas Tel. +31 70 340 - 2040 Tx: 31 651 epo nl Fax: +31 70 340 - 3016	Dekker, M Tel. +31 70 340-4046
 <small>Europäisches Patentamt - European Patent Office - Oficina Europea de Patentes</small>	

**PATENT COOPERATION TREATY**  
**PCT**  
**INTERNATIONAL PRELIMINARY EXAMINATION REPORT**  
(PCT Article 36 and Rule 70)

Applicant's or agent's file reference 2002CH001	<b>FOR FURTHER ACTION</b> See Notification of Transmittal of International Preliminary Examination Report (Form PCT/IPEA/416)	
International application No. PCT/B 03/01350	International filing date (day/month/year) 10.04.2003	Priority date (day/month/year) 12.04.2002
International Patent Classification (IPC) or both national classification and IPC C09D11/00		
Applicant CLARIANT FINANCE (BVI) LIMITED		

1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is transmitted to the applicant according to Article 36.
  
2. This REPORT consists of a total of 5 sheets, including this cover sheet.
  - This report is also accompanied by ANNEXES, i.e. sheets of the description, claims and/or drawings which have been amended and are the basis for this report and/or sheets containing rectifications made before this Authority (see Rule 70.16 and Section 607 of the Administrative Instructions under the PCT).

These annexes consist of a total of 6 sheets.
  
3. This report contains indications relating to the following items:
  - I  Basis of the opinion
  - II  Priority
  - III  Non-establishment of opinion with regard to novelty, inventive step and industrial applicability
  - IV  Lack of unity of invention
  - V  Reasoned statement under Rule 66.2(a)(ii) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement
  - VI  Certain documents cited
  - VII  Certain defects in the international application
  - VIII  Certain observations on the international application

Date of submission of the demand  10.10.2003	Date of completion of this report  25.08.2004
Name and mailing address of the international preliminary examining authority:   European Patent Office - P.B. 5818 Patentlaan 2 NL-2280 HV Rijswijk - Pays Bas Tel. +31 70 340 - 2040 Tx: 31 651 epo nl Fax: +31 70 340 - 3016	Authorized Officer  Girard, Y  Telephone No. +31 70 340-2558



**INTERNATIONAL PRELIMINARY  
EXAMINATION REPORT**

International application No. PCT/IB 03/01350

**I. Basis of the report**

1. With regard to the **elements** of the international application (*Replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this report as "originally filed" and are not annexed to this report since they do not contain amendments (Rules 70.16 and 70.17)*):

**Description, Pages**

1-39 as originally filed

**Claims, Numbers**

1-10 received on 04.05.2004 with letter of 28.04.2004

2. With regard to the **language**, all the elements marked above were available or furnished to this Authority in the language in which the international application was filed, unless otherwise indicated under this item.

These elements were available or furnished to this Authority in the following language: , which is:

- the language of a translation furnished for the purposes of the international search (under Rule 23.1(b)).
- the language of publication of the international application (under Rule 48.3(b)).
- the language of a translation furnished for the purposes of international preliminary examination (under Rule 55.2 and/or 55.3).

3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, the international preliminary examination was carried out on the basis of the sequence listing:

- contained in the international application in written form.
- filed together with the international application in computer readable form.
- furnished subsequently to this Authority in written form.
- furnished subsequently to this Authority in computer readable form.
- The statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.
- The statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished.

4. The amendments have resulted in the cancellation of:

- the description,        pages:
- the claims,        Nos.:
- the drawings,        sheets:

5.  This report has been established as if (some of) the amendments had not been made, since they have been considered to go beyond the disclosure as filed (Rule 70.2(c)).

*(Any replacement sheet containing such amendments must be referred to under item 1 and annexed to this report.)*

6. Additional observations, if necessary:

**INTERNATIONAL PRELIMINARY  
EXAMINATION REPORT**

International application No. PCT/IB 03/01350

**V. Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability;  
citations and explanations supporting such statement**

**1. Statement**

Novelty (N)	Yes:	Claims 1-6
	No:	Claims 7-10
Inventive step (IS)	Yes:	Claims 1-6
	No:	Claims 7-10
Industrial applicability (IA)	Yes:	Claims 1-10
	No:	Claims

**2. Citations and explanations**

**see separate sheet**

**INTERNATIONAL PRELIMINARY  
EXAMINATION REPORT - SEPARATE SHEET**

International application No. PCT/IB 03/01350

**Re Item V**

Reference is made to the following document: US 6 042 621 A (D1)

**1 Claims 1-6**

No prior art document discloses a printing process as set out in present claim 1 making use of at least two dyestuffs of formulae (I) to (XI) (see proviso). The subject-matter of claim 1 is therefore novel (Article 33(2) PCT).

The problem underlying the present application is the catalytic fading occurring in areas where two or more ink dots comprising different dyestuffs are in contact. The solution as set out in the application is considered as inventive for the following reason: D1 which is the closest prior art document tackles the same problem but solves it in a completely different way. Thus, the subject-matter of claim 1 involves an inventive step (Article 33(3) PCT).

Dependent claims 2-6, which contain additional features, meet also the requirements of Articles 33(2) and (3) PCT.

**2 Claims 7-10**

D1 discloses the use of a fibre-reactive dyestuff of formula I (identical to the dyestuff of formula I of present application) for printing textile substrates, i.a. cellulosic textiles (cf. column 2, lines 52-64). Printing may be carried out by an ink-jet method (cf. column 3, lines 9-10) and thus the composition employed is deemed to be water-based.

Further, the dyestuff of formula I is used in its non-salt form.

D1 is therefore novelty-destroying for the subject-matter of claims 7-10 (Art. 33(2) PCT).

**Re Item VIII**

The formulation of claims 1 and 2 renders said claims unclear.

In particular in claim 2, the expression "... characterized in that in a third step a comprises ..." is hardly understood!

Same objection applies to the related passage of the description (cf. page 6, first paragraph). On line 5, the word "having" should probably read "have" and the

**INTERNATIONAL PRELIMINARY  
EXAMINATION REPORT - SEPARATE SHEET**

International application No. PCT/IB 03/01350

word "than" (relating to "fade differently") should probably be followed by "when".

Claim 10 in its present form is redundant and does not make sense.